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EXAMINER	
INGVOLDSTAD, BENNETT	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/821,750	MAGUIRE ET AL.	
	Examiner	Art Unit	
	Bennett Ingvoldstad	2427	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *12 January 2009*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *49-89* is/are pending in the application.

4a) Of the above claim(s) *87 and 88* is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *49-86 and 89* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 12 January 2009 has been entered.

Response to Amendment

2. The examiner acknowledges the receipt on 12 January 2009 of the declaration under 37 CFR 1.131. The declaration establishes the date of Applicant's actual reduction to practice of the invention described by the evidence as being prior to the Leroy reference's filing date of 12 July 1995.

3. The evidence presented supports Applicant's reduction to practice of the subject matter of independent claims 49, 60, 70, and 80, thus invalidating Leroy as prior art for those claims. However, there is no evidence for the actual reduction to practice of the subject matter of at least claims 50-55, 57, 59, 61-65, 67, 69, 72, 74, 81, and 83. Therefore, Leroy is still prior art for these claims, since they were not reduced to practice before Leroy's filing date.

4. Claim 50 describes associating a stimulus object in a video stream by determining whether a stimulus object is present in a particular time slice of the video stream. Figure 1 of the evidence appears to show a person in a video stream, but no evidence is presented that the software can determine whether or not the person is in a particular time slice of the video stream. Claims 51-55 depend on claim 50 and thereby lack the same support.

5. Claim 57 again describes associating stimuli by indicating whether or not a stimulus object is present, but no evidence is presented that this feature was reduced to practice as described above.

6. Claim 59 describes measuring an environmental condition, but the evidence only refers to measuring audience responses.

7. Claim 61 is analogous to claim 50, and claims 62-65 depend on it.

8. Clam 67 is analogous to claim 57.

9. Claim 69 is analogous to claim 59.

10. Claim 72 describes an automatic audio analyzer, but no evidence is presented for this feature.

11. Claim 74 describes a multi-channel associative cache, but no evidence is presented for this feature.

12. Claim 81 is analogous to claim 74

13. Claim 83 is analogous to claim 59.

Election/Restrictions

14. Newly submitted claims 87 and 88 are directed to an invention that is independent or distinct from the invention originally claimed. The original invention is drawn to an audience response system as illustrated by Figure 1. However, claims 87 and 88 are drawn to a quality control system as illustrated by Figure 2B and described at page 6 of the specification. Several independent and distinct features of the claims are illustrated by the figures, such as the respondents watching a video stream in Figure 1 and the comparison of a product to a stored image of the product in Figure 2B and page 6 of the description.

15. Since applicant has received an action on the merits for the originally presented invention, this invention has been constructively elected by original presentation for prosecution on the merits. Accordingly, claims 87 and 88 are withdrawn from

consideration as being directed to a non-elected invention. See 37 CFR 1.142(b) and MPEP § 821.03.

Claim Rejections - 35 USC § 101

16. Claims 49-59 and 76 are rejected under 35 U.S.C. 101 as not falling within one of the four statutory categories of invention. While the claims recite a series of steps or acts to be performed, a statutory "process" under 35 U.S.C. 101 must (1) be tied to particular machine, or (2) transform underlying subject matter (such as an article or material) to a different state or thing. See page 10 of In Re Bilski 88 USPQ2d 1385. The instant claims are neither positively tied to a particular machine that accomplishes the claimed method steps nor transform underlying subject matter, and therefore do not qualify as a statutory process. The method of claim 49 includes the steps of "showing the at least one stimulus stream…; partitioning the at least one stimulus stream…; associating stimuli…; associating responses…; and storing an associative mapping…," which are broad enough that the claim could be completely performed manually or without a particular machine. Nor is any transformation apparent. For example, the partitioning, associating, and storing steps could be performed by manually creating and recording the associated data.

Claim Rejections - 35 USC § 102

17. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

18. Claims 49, 56, 58, 60, 66, 68, 70, 71, 73, 75, 77, 79, 80, 82, 84-86, and 89 are rejected under 35 U.S.C. 102(b) as being anticipated by US Pat No 5226177 (hereinafter "Nickerson").

Claim 49. Nickerson teaches a method of analyzing responses to a video stream comprising showing the video stream to viewer respondents (Fig 1); partitioning the video stream into time slices for display of a response signal 130 along a time axis (Fig 9 – time slices are determined using SMPTE codes in the video – col. 8, l. 3-8); associating stimuli in the video stream with the time slice in which each stimulus occurs, (eg stimulus object 132, Fig 9, is associated with an SMPTE timecode, since each video frame has a timecode in the SMPTE standard); associating responses with the time slices in which the responses are made (the response curve 130 has a component on the horizontal time axis); and storing an associative mapping that correlates each of the time slices with the stimuli and responses (response curve 130 associates response axis with time axis, and each time-axis SMPTE code is associated with the video content of a single frame – the curve 130 is stored for later retrieval – col. 8, l. 42-55).

Claim 60 generally corresponds to claim 49 and is met in view of the above and Nickerson's teaching of a computer-implemented embodiment (Fig 1).

Claims 70 and 80 generally correspond to claim 49 and are met in view of the above and Nickerson's teaching of a central apparatus for receiving the inputs, correlating the data, and storing it (col. 2, l. 58-68)

Claim 56. Nickerson teaches logging timecodes indicating the time locations of stored frames (col. 8, l. 3-8), the timecodes correlated with the stimuli and response signals as illustrated by Figure 9.

Claim 58. Nickerson teaches accessing the mapping by the responses (Figs 10, 11).

Claims 66 and 68 are analogous to claims 56 and 58 and are met as such.

Claim 71. Nickerson teaches a videotape stimulus signal (col. 7, l. 59-68), which comprises an audio stream.

Claim 73. Nickerson teaches a multi-channel associative mapping for recording responses for several groups (col. 8, l. 42-55).

Claim 75 is analogous to claim 56 and is met as such.

Claim 77. Nickerson teaches a processor for digitally processing the digital SMPTE timecodes (col. 8, l. 1-9).

Claim 79. Nickerson teaches a videotape, which is a time-delayed presentation.

Claim 82. Nickerson teaches that each digital time slice comprises a frame correlated with a response signal 130, since an SMPTE timecode is stored on a per-frame basis.

Claim 84 corresponds to claim 79 and is met as such.

Claim 85. Nickerson teaches displaying the data as it received, ie, contemporaneous with its creation (col. 8, l. 7-11).

Claim 86. Nickerson teaches that groups of responses may be associated with different variables (Fig 10); and that viewers may be disposed at different angles (e.g., in Fig 1, a male user of response device 12 is disposed at a different angle than a female user of apparatus 14).

Claim 89. Nickerson teaches an analyzer for statistically analyzing the response signals (col. 10, l. 89), wherein the analyzer may be used to find selected segments of the stimulus signal, such as a "question 4" segment (Fig 10).

19. Claims 50-55, 57, 59, 61, 62, 65 67, 69, and 83 are rejected under 35 U.S.C. 102(e) as being anticipated by Leroy (US 5812642).

Claim 50: Leroy anticipates the following as indicated:

A method of analyzing responses to at least one stimulus stream (a broadcast promotion [col. 4, l. 45-50]), the method comprising:

showing the at least one stimulus stream to one or more respondents (to an audience which responds to the broadcast promotion [col. 4, l. 45-46]);

partitioning the at least one stimulus stream into a series of time slices (a series of time segments [col. 4, l. 45-52], illustrated as segments along a timeline 20 [Fig 7]);

associating stimuli in the at least one stimulus stream with the time slice in which each stimulus occurs (segments have an associated presenter- "Bob", "Kim"- and/or associated symbol 40 representing the segment content [Fig 7]);

associating responses of the one or more respondents to the at least one stimulus stream with the time slices in which each response is made (associating a number of calls with the time segment in which the calls are received [Fig 7]); and

storing an associative mapping for the at least one stimulus stream that correlates each of the time slices with the stimuli and the responses (the call data is mapped to a time along the horizontal axis, the time is associated with the call data and the specific segment [Fig 7]).

wherein the at least one stimulus stream comprises a video stream (a broadcast promotion [col. 4, l. 45-47]) and wherein stimuli comprise objects that appear in one or more of the time slices and wherein associating stimuli comprises determining whether one of the objects is present in a time slice of the video stream (names and symbols 40 are associated with time segments in which they appear [Fig 7]).

51. The method of claim 50 wherein one of the objects comprises a person ("Bob" or "Kim" [Fig 7]).

52. The method of claim 50 wherein the at least one stimulus stream further comprises an audio stream (a television broadcast [col. 4, l. 45-47] has an audio component).

53. The method of claim 52 further comprising analyzing the audio stream to produce text strings (a timeline containing text strings describing the segments, e.g. "Bob", is produced by manual analysis [col. 5, l. 1-8]).

54. The method of claim 53 wherein associating stimuli further comprises determining whether one of the text strings is present in a time slice of the audio stream (determining whether Bob is present in a segment, in order to display the text string "Bob" on the segment timeline [Fig 7]).

55. The method of claim 52 wherein the associative mapping comprises a multi-channel associative mapping (response data may be taken for multiple programs [Fig 5]).

57. A method of analyzing responses to at least one stimulus stream (a broadcast promotion [col. 4, l. 45-50]), the method comprising:

showing the at least one stimulus stream to one or more respondents (to an audience which responds to the broadcast promotion [col. 4, l. 45-46]);

partitioning the at least one stimulus stream into a series of time slices (a series of time segments [col. 4, l. 45-52], illustrated as segments along a timeline 20 [Fig 7]);

associating stimuli in the at least one stimulus stream with the time slice in which each stimulus occurs (segments have an associated presenter- "Bob", "Kim"- and/or associated symbol 40 representing the segment content [Fig 7]);

associating responses of the one or more respondents to the at least one stimulus stream with the time slices in which each response is made (associating a number of calls with the time segment in which the calls are received [Fig 7]); and

storing an associative mapping for the at least one stimulus stream that correlates each of the time slices with the stimuli and the responses (the call data is mapped to a time along the horizontal axis, the time is associated with the call data and the specific segment [Fig 7]).

associating stimuli comprises indicating whether or not a stimulus is present in each of the time slices (timeline 20 associates responses with a stimuli that is present in a time segment [Fig 7]).

59. A method of analyzing responses to at least one stimulus stream (a broadcast promotion [col. 4, l. 45-50]), the method comprising:

showing the at least one stimulus stream to one or more respondents (to an audience which responds to the broadcast promotion [col. 4, l. 45-46]);

partitioning the at least one stimulus stream into a series of time slices (a series of time segments [col. 4, l. 45-52], illustrated as segments along a timeline 20 [Fig 7]);

associating stimuli in the at least one stimulus stream with the time slice in which each stimulus occurs (segments have an associated presenter- "Bob", "Kim"- and/or associated symbol 40 representing the segment content [Fig 7]);

associating responses of the one or more respondents to the at least one stimulus stream with the time slices in which each response is made (associating a number of calls with the time segment in which the calls are received [Fig 7]); and

storing an associative mapping for the at least one stimulus stream that correlates each of the time slices with the stimuli and the responses (the call data is mapped to a time along the horizontal axis, the time is associated with the call data and the specific segment [Fig 7]).

further comprising measuring an environmental condition and associating the measurements with the time slices (a telephone used to gather response data [col. 5, l. 9-19] measures a sound environmental condition).

61. A computer readable medium encoded with a computer program for analyzing responses to at least one stimulus stream partitioned into a series of

time slices (time segments [col. 4, l. 45-59]), the computer program code comprising:

program code for associating stimuli in the at least one stimulus stream with the time slice in which each stimulus occurs (segments have an associated presenter- "Bob", "Kim"- and/or associated symbol 40 representing the segment content [Fig 7]);

program code for associating responses to the at least one stimulus stream with the time slices in which each response is made (associating a number of calls with the time segment in which the calls are received [Fig 7]); and

program code for storing an associative mapping for the at least one stimulus stream that correlates each of the time slices with the stimuli and the responses (the call data is mapped to a time along the horizontal axis, the time associated with the call data and the specific segment [Fig 7]).

wherein the at least one stimulus stream comprises a video stream (a broadcast promotion [col. 4, l. 45-47]) and wherein stimuli comprise objects that appear in one or more of the time slices (see stimuli along timeline 20 [Fig 7]) and wherein the program code for associating stimuli comprises program code for determining whether one of the objects is present in a time slice of the video stream (via manual event coding [col. 5, l. 1-8]).

62. The computer readable medium of claim 61 wherein the at least one stimulus stream further comprises an audio stream (a television broadcast [col. 4, l. 45-47] has an audio component).

65. The computer readable medium of claim 62 wherein the associative mapping comprises a multi-channel associative mapping (response data may be taken for multiple programs [Fig 5]).

67. A computer readable medium encoded with a computer program for analyzing responses to at least one stimulus stream partitioned into a series of time slices (time segments [col. 4, l. 45-59]), the computer program code comprising:

program code for associating stimuli in the at least one stimulus stream with the time slice in which each stimulus occurs (segments have an associated presenter- "Bob", "Kim"- and/or associated symbol 40 representing the segment content [Fig 7]);

program code for associating responses to the at least one stimulus stream with the time slices in which each response is made (associating a number of calls with the time segment in which the calls are received [Fig 7]); and

program code for storing an associative mapping for the at least one stimulus stream that correlates each of the time slices with the stimuli and the responses

(the call data is mapped to a time along the horizontal axis, the time associated with the call data and the specific segment [Fig 7]).

wherein the program code for associating stimuli comprises program code for storing indications of whether or not a stimulus is present in each of the time slices (timeline 20 associates responses with a stimuli that is present in a time segment [Fig 7]).

69. A computer readable medium encoded with a computer program for analyzing responses to at least one stimulus stream partitioned into a series of time slices (time segments [col. 4, l. 45-59]), the computer program code comprising:

program code for associating stimuli in the at least one stimulus stream with the time slice in which each stimulus occurs (segments have an associated presenter- "Bob", "Kim"- and/or associated symbol 40 representing the segment content [Fig 7]);

program code for associating responses to the at least one stimulus stream with the time slices in which each response is made (associating a number of calls with the time segment in which the calls are received [Fig 7]); and

program code for storing an associative mapping for the at least one stimulus stream that correlates each of the time slices with the stimuli and the responses (the call data is mapped to a time along the horizontal axis, the time associated with the call data and the specific segment [Fig 7]).

program code for associating measurements of environmental conditions with the time slices (a telephone used to gather response data [col. 5, l. 9-19] measures a sound environmental condition).

70. An apparatus for analyzing responses to at least one stimulus stream comprising:

an input for receiving responses from one or more respondents to the at least one stimulus stream [col. 5, l. 31-37];

a correlator for correlating the responses and a plurality of stimuli in the at least one stimulus stream with time slices of the stimulus stream to generate an associative mapping of the responses and the stimuli with the time slices of the stimulus stream (the call data is mapped to a time along the horizontal axis, the time associated with the call data and the specific segment [Fig 7]); and

a storage module operatively coupled with the correlator, the storage module storing the associative mapping [col. 6, l. 6-13].

Claim 80 is met as indicated above.

Claim 83 corresponds to claim 59 and is met as such.

Claim Rejections - 35 USC § 103

20. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

21. Claims 63, 64, and 72 are rejected under 35 U.S.C. 103(a) as being unpatentable over Leroy (US 5812642) in view of Lyberg (US 5752227).

63. Leroy does not further teach the computer readable medium of claim 62 further comprising program code for analyzing the audio stream to produce text strings.

Lyberg discloses a speech to text conversion system for analyzing an audio stream and producing text strings [Abstract].

It would have been obvious to incorporate the speech to text conversion into Leroy's event coding [col. 5, l. 1-8], according to known methods, to yield the predictable result of converting the speech in the audio stream into text, thus assisting or replacing the manual event coder in labeling the time segments with event codes that describe the discussion during various time segments (see timeline 20 [Fig 7]).

Leroy teaches:

64. The computer readable medium of claim 63 wherein the program code for associating stimuli further comprises program code for determining whether one

of the text strings is present in a time slice of the audio stream (labeling the time segments with the appropriate text string event code [Fig 7]).

Claim 72 is obvious in the same manner as claim 63.

22. Claims 74 and 81 are rejected under 35 U.S.C. 103(a) as being unpatentable over Leroy (US 5812642).

74. Leroy does not specifically disclose storing the associative mapping in an associative cache.

However, Applicant's admission (in view of the lack of traversal of the OFFICIAL NOTICE from the office action dated 6 March 2008) provides evidence that it was well known to store an associative mapping in an associative cache.

Therefore it would have been obvious to have stored the associative mapping in an associative cache, due to the well known utility of an associative cache for storing an associative mapping.

Claim 81 corresponds to claim 74 and is met as such.

23. Claims 76 and 78 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nickerson in view of US Pat No 5689641 (hereinafter "Ludwig").

Claim 76. Nickerson does not specifically teach prompting a user for search criteria and then displaying the stimulus stream responsive to the search criteria.

Ludwig teaches a method of accessing a stored video (cols. 30, 31) comprising accessing a video by entering search criteria and then displaying the video according to the search criteria (col. 31, l. 40-47).

It would have been obvious to implement the video storage search ability into the video storage system of Nickerson for the purpose of quickly accessing a desired portion of a video stimulus stream.

Claim 78. Nickerson in view of Ludwig teaches searching for time slices as indicated above. Thus, Nickerson in view of Ludwig further teaches a user interface for allowing searching in the associative mapping, since timecodes may be searched (Ludwig col. 31, l. 40-47) and timecodes are part of the associative mapping (Nickerson Fig 9); And retrieving the searched-for video segment for display (Ludwig col. 31, l. 40-47), where video segments may be displayed with analyses of the responses and playback of the time slices (Nickerson col. 8, l. 42-55).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Bennett Ingvoldstad whose telephone number is (571)270-3431. The examiner can normally be reached on M-F 9-5 EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Scott Beliveau can be reached on (571) 272-7343. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Bennett Ingvoldstad/
Examiner, Art Unit 2427

/Scott Beliveau/
Supervisory Patent Examiner, Art Unit 2427